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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/725,022

12/02/2003

Jui-Cheng Chang

CHANG190

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1444

7590

01/19/2006

BROWDY AND NEIMARK, P.L.L.C.

624 NINTH STREET, NW

SUITE 300

WASHINGTON, DC 20001-5303

EXAMINER

NI, SUHAN

ART UNIT

PAPER NUMBER

2646

DATE MAILED: 01/19/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b> 10/725,022	<b>Applicant(s)</b> CHANG, JUI-CHENG	
	<b>Examiner</b> Suhan Ni	<b>Art Unit</b> 2646	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☐ Responsive to communication(s) filed on 03 November 2005.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-9 is/are pending in the application.
- 4a) Of the above claim(s) 7-9 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-6 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.


#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

  
**SUHAN NI**  
**PRIMARY EXAMINER**

#### Attachment(s)

- |   |  |
|---|--|
| <p>1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)</p> <p>2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)</p> <p>3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br/>Paper No(s)/Mail Date _____</p> | <p>4) <input type="checkbox"/> Interview Summary (PTO-413)<br/>Paper No(s)/Mail Date. _____</p> <p>5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)</p> <p>6) <input type="checkbox"/> Other: _____</p> |
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Art Unit: 2646

**DETAILED ACTION**

1. The Art Unit location of your application in the PTO has changed. To aid in correlating any papers for this application, all further correspondence regarding this application should be directed to Group **Art Unit 2646**.

***Response to Election/Restriction***

2. This communication is responsive to the provisional election made with traverse on 11/03/2005 to prosecute the invention of Group I, claims 1-6. Group II, claims 7-9 are withdrawn from further consideration, as being drawn to a non-elected invention. A complete reply to a future final office action must include cancellation of non-elected claims or other appropriate action (37 CFR 1.144). See MPEP § 821.01.

3. Applicant's election with traverse is acknowledged and has been fully considered, but the traversal is not found to be persuasive because a distinctive feature or limitation in group II, claim 7 claims "a damper at the center ... having ... and a center part **fixedly connected** to an inner side of said cap" (Fig. 2). Therefore, both inventions are distinct for the reasons giving above and have acquired **a separate status** in the art as shown by their different classifications (381/404, 381/391), restriction for examination purposes as indicated is proper.

4. Because these inventions are distinct for the reasons given above and the search required for Group II is not required for Group I. Restriction for examination purposes as indicated is proper.

The requirement is still deemed proper and is therefore made **FINAL**.

***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) The invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) The invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

5. Claims 1 and 3-5 are rejected under 35 U.S.C. 102(b) as being anticipated by Czerwinski (U. S. Pat. - 4,239,943).

Regarding claim 1, Czerwinski discloses a thin type speaker comprising: a casing (10) having a top-open receiving chamber; an electromagnet set (22-23) mounted in said top-open receiving chamber, said electromagnet set having a yoke, a magnet, a pole piece, and a voice coil (21); and a vibration diaphragm (12) peripherally connected to a periphery of said top-open receiving chamber of said casing, wherein said vibration diaphragm has a damper (11) at the center thereof, said damper having a corrugated cross section (11) and a center part (90) fixedly connected to said electromagnet set; said voice coil of said electromagnet set is provided at one side of said vibration diaphragm facing said top-open receiving chamber and said voice coil is connected to a periphery of said damper (Fig. 2) as claimed.

Regarding claim 3, Czerwinski further discloses the speaker, wherein the center part of said damper is fixedly connected (25) to said pole piece of said electromagnet set.

Regarding claim 4, Czerwinski further discloses the speaker, wherein said electromagnet set further comprises a core member (23, 25) disposed inside said voice coil and the center part of said damper is fixedly connected to said core member of said electromagnet set.

Regarding claim 5, Czerwinski further discloses the speaker, wherein said damper is integrally formed with said vibration diaphragm (Figs. 2-3) as claimed.

6. Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by Ki et al. (U. S. Pat. - 5,848,174).

Regarding claim 1, Ki et al. disclose a thin type speaker comprising: a casing (10) having a top-open receiving chamber; an electromagnet set (20, 22) mounted in said top-open receiving chamber, said electromagnet set having a yoke, a magnet, a pole piece, and a voice coil (40); and a vibration diaphragm (30) peripherally connected to a periphery of said top-open receiving chamber of said casing, wherein said vibration diaphragm has a damper (62) at the center thereof, said damper having a corrugated cross section (62) and a center part fixedly connected to said electromagnet set; said voice coil of said electromagnet set is provided at one side of said vibration diaphragm facing said top-open receiving chamber and said voice coil is connected to a periphery of said damper (Fig. 1) as claimed.

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Czerwinski (U. S. Pat. - 4,239,943).

Regarding claim 2, Czerwinski does not clearly teach a cap covered over a top side of said vibration diaphragm and peripherally bonded to said casing, said cap having a plurality of sound holes as claimed. Since providing a protective cap or grille for a speaker is very well known in the art, it therefore would have been obvious to one skilled in the art at the time the invention was made to be motivated to provide a suitable cap or grille for the speaker as an alternate choice, in order to provide better protection to the speaker and make the speaker more durable.

8. Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over Ki et al. (U. S. Pat. - 5,848,174).

Regarding claim 6, Ki et al. further disclose the thin type speaker, wherein said vibration diaphragm has an annular shape; said damper has an outer peripheral edge connected to an inner peripheral edge of said vibration diaphragm (Fig. 1). But Ki et al. do not clearly teach the material for making the diaphragm as claimed. Since providing different material for the diaphragm and damper for a speaker is very well known in the art, it therefore would have been obvious to one skilled in the art at the time the invention was made to be motivated to provide a suitable material which being different to the material of damper for the speaker as an alternate choice, in order to provide a speaker with more desirable acoustic effect, especially in a high frequency response range speaker.

### ***Conclusion***

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Suhan Ni** whose telephone number is **(571)-272-7505**, and the number for fax machine is **(571)-273-7505**. The examiner can normally be reached on Tuesday and Thursday from 10:00 am to 8:00 pm, and may be reached on Monday, Wednesday and

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Friday from 10:00 am to 8:00 pm. If it is necessary, the examiner's supervisor, **Sinh N. Tran**, can be reached at **(571)-272-7564**.

10. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (**PAIR**) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov/>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

11. Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the group receptionist whose telephone number is **(571)-272-2600**, or please see <http://www.uspto.gov/web/info/2600>.

January 14, 2006



**SUHAN N.**  
**TRAN**  
**EXAMINER**